CALIFORNIA HIGH-SPEED RAIL AUTHORITY MEETING MINUTES June 21, 2000

LOS ANGELES, CALIFORNIA

The meeting of the California High-Speed Rail Authority was called to order on June 21, 2000 at 1:00pm at the Metropolitan Transportation Authority at 1 Gateway Plaza, in Los Angeles, California.

Members Present: Michael E. Tennenbaum, Chairman

Edward P. Graveline, Vice Chairman

T.J. Stapleton John P. Fowler William E. Leonard Jerry Epstein

Donna Lee Andrews

Members Absent: Dr. Ernie Bates

Approval of Minutes for May 30, 2000 Meeting

Chairman Tennenbaum presented the minutes for approval. Member Leonard moved to approve the minutes. Vice Chairman Graveline seconded the motion, which carried 6-0 (Member Bates was absent and Member Epstein abstained).

Authority Members Meetings for Compensation

Executive Director Morshed presented the list of meetings for compensation. Member Fowler moved to approve the list. Member Stapleton seconded the motion, which carried 7-0 (Member Bates was absent).

Members Report

Member Leonard stated that he and Vice Chairman Graveline were instructed by the Authority to prepare a response to Senator Polanco regarding his legislation, SB 2019. He stated they have prepared a letter that is five pages and he would like to submit the letter for the record and the Chairman's signature. Member Leonard stated that the last paragraph of the letter was the heart of their recommendation and then read the paragraph as follows:

"For all these reasons, we respectfully urge you to amend SB 2019 to make the bill technology neutral. We believe changing all references to maglev to high-speed train technology is a more prudent approach and one that provides the Davis Administration and the Legislature with greater flexibility in pursuing the development of high-speed trains in California."

Member Epstein stated that on Saturday, late in May, there was a meeting with members of the German Bundestag and with the members of the Authority's committee (specifically Members Andrews and Epstein) to discuss the SCAG maglev project. He stated that he and others had a chance to meet with the members of Bundestag and that the discussion was useful. He said that

he asked the Germans if they would be willing to provide California with a financial guarantee for maglev like the U.S. government was. Member Epstein said the Germans indicated that they could not and would not. He stated that they said they would consider providing a loan guarantee like the federal TIFIA (Transportation Infrastructure Finance and Innovation Act) program.

Executive Directors Report

Executive Director Morshed reported that Member Bates did not attend the June 21 Authority meeting because he is in New York City receiving the prestigious Kjakan award for "Spirit Entreprenuerialship" and stated that the Authority should congratulate Member Bates on his award.

Executive Director Morshed stated that the Business, Transportation and Housing Agency has a new deputy that will be handling rail issues. He stated that the new deputy is Mr. Rick Vargas. Executive Director stated that Mr. Vargas has worked for the California Transportation Commission and also was the Transportation Advisor to Speaker of the Assembly Antonio Villaraigosa. He noted that Mr. Vargas was at the meeting today and introduced him.

Executive Director Morshed stated that Member Jim Mills resigned from the Authority and that the position is now vacant. He stated that Member Mills' letter of resignation has been accepted by Senator Burton.

Executive Director Morshed stated that Authority staff does not anticipate any need for the Authority meeting scheduled for July.

Review and Approval of Maglev Deployment Program "Project Description"

Chairman Tennenbaum stated that the main reason for the June Authority meeting was to consider the Maglev Deployment Program approval request. He stated that each Board Member has three alternative resolutions: 1) to accept, 2) to reject and 3) to modify. He stated that he would urge Members to read these resolutions through during the presentation.

Executive Director Morshed stated that the Authority was pursuing this activity at the request of the Governor and the Secretary of BT&H Agency, which the Authority accepted. "The Secretary stated that the Authority would manage the project and that the final report, which in this case is the "Project Description," would be issued in the name of the Authority in cooperation with SCAG. The key point is that as long as the Authority accepts this direction, the Secretary has the prerogative of changing, the report needs to be issued in the name of the Authority. The "Project Description" that is before the Authority, was scheduled to be presented to the working group last Tuesday, the 13^{th.} However, the meeting was not properly noticed for a state agency, and therefore, Authority Board Members could not attend. So, the presentation was made to the Members of SCAG. Since that Tuesday meeting, there were some substantial changes in the "Project Description" both in the corridor evaluation and financing. Al Perdon will go through that and explain it to Members. So what is before the Authority is not the actual document that you are being asked to approve. SCAG and Parsons Transportation Group will provide you with the proper document. In the staff memo, I laid out some of the issues before the Authority that you will need to address and think about as you listen to those things and then

at the conclusion you have three options. We will go through that and keep in mind that the after we finish with all of those things, you will need to pick one of those decisions. I also want to point out an important factor and that is that in the "Project Description" there is a requirement that there will be an implementing agency. In that document, the implementing agency is designated as being the Authority in a joint powers agreement with other entities." Mr. Morshed noted that the Authority never entertained that idea or discussed on record whether or not the Authority approves or disapproves of the idea. Mr. Morshed stated that he made it clear to Al Perdon that if they expect the Board to adopt a document, then they have the obligation to make sure that the Board has every page and every word that needs to be in that document in front of them before they make the decision.

Al Perdon stated that he would like to go through the document, beginning with a presentation by the Project Manager for Parsons Transportation Group, who has done the technical work on this program and who has prepared this document. The presentation will highlight what is in the document, including the findings and the recommendations. Mr. Perdon wanted to make sure that it was clear to everyone, both on the Board and in the audience, what the action is before the Authority. "This is a document that, according to the letter from the Secretary, would come from the Authority with cooperation with SCAG. So the Secretary is asking that basically the Authority endorse this document and put its signature on it along with SCAG as a cooperating agency. The question is, what happens with this document, what is its significance? And in this stage of the federal program, what the FRA is looking for are project descriptions from the seven participating states identifying a project that could be implemented to meet the federal demonstration goals: the goal of demonstrating maglev technology in an urban setting. That is why it is called the Maglev Deployment Program. The action today is to submit the Project Description, which according to the grant agreement with the FRA, we are required to do. This is an obligation we have to submit a Project Description, the final task under this grant agreement. The question is then what happens once this Project Description is submitted to the FRA. The FRA will look at ours, compare the state's project with the other projects and then select one or more projects to be funded by the federal government for continuing engineering analysis, financial analysis and environmental analysis. Included in that environmental analysis would be the preparation of a federal environmental impact statement and a state environment impact report. The action today is to approve the document before you with the modifications that Charlie DeWeese, the Project Manager from Parsons, will present to you so you can look at every page that has changed. He'll identify the significance of the changes, some of these are cosmetic, and some deal with substantive issues that the Members have expressed an interest in. If you approve the report as is or with the amendments, or with whatever additional modifications, then the Project Description will go back to the FRA and then we will find out whether or not California's project is going to be awarded additional federal funding for continuing the analysis through the EIR stage."

Chairman Tennenbaum stated that he would like to hear from the Mayor of the City of Monrovia, Bob Bartlett, regarding policy questions addressing the extent to which there is sufficient data available in the world in order to justify proceeding and also whether maglev is in fact the optimum method for moving people over these relatively short and curvy distances.

Mayor Bartlett stated he has been working on the maglev project for approximately three years and that this project came to SCAG through Project California, which conceived of the idea pursuing maglev. "Names such as Mel Curry, Roy Anderson, Steve Sample, Ed Stone were involved in Project California. These are some of the great minds of Southern California and entrepreneurial giants. And they said SCAG should pursue this, so we have. Also I want to point out that the prior Governor and a bipartisan group of legislators said to do this. Pete Wilson signed it, Brulte, Willie Brown, David Roberti and others signed on saying, 'pursue this' and we have. SCAG represents 186 cities, 17 million people and we believe that our regional transportation plan should be carried out. We include in that regional transportation plan this 82-mile segment of magley as a way to reduce pollution and to increase mobility. Without it, we will not be able to make a conformity finding for our region, which means that some \$4 billion in federal funds will be lost to this region until we can make a conformity finding. We believe that we should send this project forward because it is good for California. This could be an incubator industry starting for California. We think that there are jobs and opportunities for all citizens in our region. We believe that should this project move forward, it does nothing to harm the statewide project that you folks are pursuing. As a matter of fact, you can remain technology neutral, which you have said you wanted to do and we think you can still continue to do that. And I wish to indicate to you at this time, we have several cities with resolutions of support. I won't read them all off to you. But several cities have indicated support and you are going to need that kind of support when you move forward with your project. And I think you are going to need our help. And the same goes for the number of companies in this area that have indicated a willingness and a desire to work with us on this project. The list is pretty massive, as you can see. These are very top name companies, Bechtel, Lockheed, and others, that are interested in working on this project. The federal government has said that they want to deploy maglev someplace in these United States, whether we or others believe it is the right technology doesn't matter. They have set aside \$950 million and they are going to deploy a project someplace. Why not California? It will be built in one of seven cities, whether we are the ones that get it or not. So I am asking the state High-Speed Rail Authority to say, 'send that application in, let's hope that California is the one state that gets the project or one of a couple that get funded for the EIS.' That is the next step and that merely says you can employ other alternatives so you can continue to pursue your steel-on-steel if you want or other technologies. It doesn't preclude you from doing that. I think bottom line, we are asking for your support. We are asking you to help California be successful. There are others that are competing with us: Nevada, Pittsburgh, Baltimore, Louisiana, Atlanta, Florida and ourselves. And all of those people think they have a great project. We think we have the greatest project. And with the greatest opportunity for success."

Chairman Tennenbaum states that Mayor Bartlett's presentation was very persuasive. He stated that he wondered if he had considered that if there were other modes of transport that would be more economically feasible, given the route and the configuration.

Mayor Bartlett responded no. "When this program was set forth by FRA, it specifically called for magley, so we didn't have an opportunity to say that there may be other opportunities for us. They have set aside \$950 million to deploy magley somewhere in these United States. And I dare to folks to set a new paradigm as we move forward in the next century. We cannot depend on the old paradigms for transportation. I think we have to start to look at other opportunities for

ourselves. There were people some years ago who said that jet transportation would not be feasible for passenger opportunities and the reason was that because by the time the jets got up to full speed, they would be coming back down again and therefore it would not make sense economically to use jets in passenger traffic. We now know that was a big mistake. I think the same thing is going to happen with ground transportation. Maglev would be a quantum leap into the new century. Maglev is a "jet on the ground" so to speak. The Authority could continue to look for TGV or other opportunities. Those are all viable opportunities. (But) for Southern California, this is the project. Economically maglev makes sense. I have looked at the numbers and it 'pencils out' on a public-private partnership. The public sector would not have to finance maglev."

Chairman Tennenbaum thanked Mayor Bartlett. He added that there are not many jets that go from Ontario to LAX through Union Station.

Mayor Bartlett stated that he was talking about transportation on the ground.

Al Perdon introduced Charlie DeWeese to make his presentation. A copy of his presentation is available upon request.

During Mr. DeWeese's presentation, questions were asked by Authority staff and Members. These questions and answers are as follows:

Executive Director Morshed stated that Mr. DeWeese mentioned that the project is from March AFB to Ontario to LAX, but he understood that what was actually included in the Project Description does not go to March.

Mr. DeWeese stated that that was correct. He stated that the most fiscally attractive project right now is LAX-Union Station-Industry or West Covina-Ontario-San Bernardino and Riverside. He stated that March is not precluded, but that particular set of segments gives the best financial performance that has been found to date. A combination of ridership, operating costs, and capital costs.

Chairman Tennenbaum asked how would it go to Riverside from Ontario airport.

Mr. DeWeese stated it would go along the 10 and the railroad rights-of-way from Ontario to San Bernardino and then turn south along the 215 to Riverside.

Chairman Tennenbaum stated that he wanted to make sure that it was not near any property he owns.

Member Epstein stated that when Mr. DeWeese was talking about the 240 mile per hour segment, did that include all the alignments to be considered during the EIS.

Mr. DeWeese stated that, "When we do the EIS, to comply with NEPA and CEQA, we have to consider all the alignments that we have identified as possible and I don't want to think about it, but there might even be another alignment out there we haven't considered. I don't think so, but

I'm not positive. But yes, we have to consider them all because that is what the environmental process requires."

Member Epstein asked to achieve the 240 miles per hour, is that the one going down the I-10, is that the one on the I-210 or the RT-60?

Mr. DeWeese stated that we achieved the 240-mile per hour on the 10. Either between Industry and Ontario, which is where it is possible for a very short distance, or between Ontario and San Bernardino where it is also possible for a very short distance.

Executive Director Morshed asked if 240 miles per hour is an FRA requirement for deployment.

Mr. DeWeese stated this was correct.

Executive Director Morshed stated it is not a corridor requirement. He stated that the demand for travel in the corridor does not require a 240 mile per hour train. He stated that the train will go 240 miles per hour only because FRA wants it that way.

Mr. DeWeese stated this was correct.

Mr. DeWeese made the statement that the conclusion that was reached by SCAG and that we have been pursuing is that Maglev is the most appropriate for this corridor. Executive Director Morshed asked what kind of analytical work was performed to reach that conclusion.

Mr. DeWeese stated that, "My understanding was that SCAG in issuing the technical RFP had already looked at what was possible and saw that Maglev would work in this corridor because the load requirements of maglev are distributed over the length of the vehicle versus at the trucks as in steel wheel steel rail system and that it would therefore be possible to build it and not be intrusive and not take any more of the freight railroad right-of way than was absolutely possible. We have hypothesized some use of freight railroad right-of-way, not much. We have had brief discussions with the UP and they haven't taken us that far."

Executive Director Morshed said, "If that is the case then would I be safe to conclude then that in this corridor the options that the Authority selected and presented in its business plan, which was for steel-wheel-on-steel-rail technology with an actual speed of 200 miles an hour, but considerably lower speeds in that corridor, considerably lower costs, are not appropriate based on your assertion?"

Mr. DeWeese stated, "The market they are trying to serve in this corridor is well-served by maglev. I have read the Authority's business plan and you all are serving a different market, except for the commuters in this corridor."

Executive Director Morshed stated, "The station locations are the same, the corridor is the same. The Authority issued a document stating that steel-wheel is an appropriate technology. If Mr. DeWeese's assertion is correct, then the Authority would have to go back and correct its statement because it selected the wrong technology."

Mr. DeWeese disagreed. "I do not think that was the case at all. If I understood what the business plan stated, it says that the Authority thinks that a corridor from San Diego, up through Temecula, Riverside, Los Angeles, and up to the northern part of the state, is a good thing for the state. I agree with that. You have identified the steel-wheel/steel-rail technology as an appropriate technology to consider in your development. There is no quarrel with that. You have identified the potential to haul commuters in the area between Temecula and Los Angeles as a potential adjunct to your intercity mission. That is fine. It is analogous to Amtrak and the commuter agencies in the northeast corridor and in the LOSAN corridor. We have identified maglev with its particular speeds and so forth in this route as a viable transportation alternative also."

Chairman Tennenbaum stated, "With all due respect, it seems to me that you (Mr. DeWeese) stated that maglev was the optimum for the market they wish to serve and you were relying on some data generated by SCAG." He stated that he was wondering if Authority staff had ever seen that data.

Al Perdon stated, "SCAG looked at the performance characteristics of the maglev system as they understood it. This was before this current study was initiated. The performance characteristics that appeared very attractive to SCAG were the quieter noise emissions from this technology, the ability to operate this system in an automatic, automated mode, reducing operating costs. Other characteristics of this technology that appeared very promising to SCAG suggested that this was a technology that should be further pursued and it was on the basis of those initial evaluations and assessments that SCAG decided to pursue the federal maglev deployment project. It is the purpose of this study, in part, to verify those initial perceptions and assessments that SCAG arrived at based on a limited analysis of information provided on the various technologies available."

Chairman Tennenbaum stated, "I understood Mr. DeWeese to say that there had been a comparison made and that this mode was selected as a result of the comparison."

Mr. DeWeese stated, "The work that we pursued with SCAG, the RFP, and the job we're doing was to evaluate maglev in this corridor. In the process of doing it, we reviewed information that came from the corp of engineers, cold weather regions report that was prepared to summarize the national maglev initiative...I accepted it at face value that SCAG selected this as a corridor for maglev. It's appropriate and it's the most appropriate."

Chairman Tennenbaum asked on what basis did he (Mr. DeWeese) conclude maglev was the most appropriate.

Mr. DeWeese stated, "The lower operating costs and the similar construction costs."

Chairman Tennenbaum asked Mr. DeWeese, "Are you saying that the construction costs of maglev would be comparable to a more conventional high-speed rail?"

Mr. DeWeese stated, "I think they will be similar, yes."

Chairman Tennenbaum asked, "Would be of the same order of magnitude?"

Mr. DeWeese stated yes.

Chairman Tennenbaum asked would the operating costs be lower.

Mr. DeWeese stated yes.

Chairman Tennenbaum stated, "To the extent that you get a higher speed it would be a bonus and would help ridership."

Mr. DeWeese stated that was correct.

Chairman Tennenbaum stated that there would be a smaller footprint and greater acceleration. He stated that the Authority is familiar with maglev attributes and that in fact, the Authority was attracted to the idea of having maglev for long stretches in the Authority's system. He stated that the Authority was put off by the lack of any operating history and the failure to have warranties on maintenance and operating specs from any deep pocket entity. He stated that he has spent five years pursuing the high-speed rail idea and has asked continuously to see some major entity stand behind warranties and they have never come to the table. He stated that he trusts that something like that is in Mr. DeWeese's calculation.

Mr. DeWeese stated that if the Chairman would like, he could address that issue now.

Chairman Tennenbaum stated that he saw Transrapid doing it, but he didn't think that they had a deep financial pocket.

Mr. DeWeese stated that that was the point that he wanted to make. "We brought this up with Transrapid and said let's see how many employees are there in Transrapid USA and so forth. And so, what we have are some letters from the parents..."

Chairman Tennenbaum interrupts to state, "Those are deep pockets."

Mr. DeWeese stated that that was correct. He continued by stating that he had letters from Thyssan Krupp Industries and Siemens and that they have copies of these letters that they can distribute.

Chairman Tennenbaum asked could Mr. DeWeese just tell the Board whether they were prepared to have the parents stand behind their operating specs?

Mr. DeWeese stated that is what the letters state and that they could pass them out to the Board.

Chairman Tennenbaum stated that he did better than the Authority did because the Authority never got such letters.

Mr. DeWeese stated that it was not easy to obtain the letters. He further stated that if the Authority had not softened them up, they would not have gotten the letters.

Al Perdon stated, "When the German government representatives came on May 20, 2000, Member Epstein made a big point of these technologies. And some of the reason why we have these letters today is because of Mr. Epstein's harsh questioning. And as a result of that, a gentleman from the German government had some influence in getting these letters. I think we have both the German and the Industry group recognizing that just because they've spent five billion deutchmark and just because they are confident, they need to do more to demonstrate to us that the risk of going forward with this program are with them, and not with the people of California. So I think this is the outcome of those discussions."

Chairman Tennenbaum stated, "It was not just for the people of California. If you are going to finance this before you get rating agencies and lenders, they are going to need something like that."

Al Perdon stated that that was ultimately the test. He stated that that is who we are asking to finance this. So, they have to be convinced.

Chairman Tennenbaum stated that he now understands that Parsons is saying that they've explored data that compares capital costs, operating costs and ridership, with respect to this corridor and based on that data for rail considers maglev to be the optimum mode.

Mr. DeWeese stated that was correct.

Member Leonard stated that that was not what the letter stated.

Chairman Tennenbaum stated that was his main concern.

Vice Chairman Graveline stated that Mr. DeWeese mentioned that construction would be less than or comparable to steel-wheel on rail and yet he has a number of published reports and German newspapers suggesting that the reason the German government pulled out was because of the cost overrides on the guideway construction.

Mr. DeWeese stated that he thought there was another set of circumstances involved in that and it was another decision. He stated that he did not know if it was a good or bad decision. He stated that his understanding was that the German railroad said it could achieve most ofby spending a considerably less sum of money. He stated that if he remembered correctly, the numbers were 2½ hour trip now between the two cities and maglev would offer an hour and a half and the German railroad said it could get to two hours if they spent a third of the capital cost to improve the existing system. He stated that that was a value engineering approach and it is neither good nor bad. He stated would we be willing to accept 75% of the benefit for 25% of the cost. And frequently the answer to that is yes. He stated that the downside to that is you will never get to the higher level of benefit, never get to the faster travel. He stated then you would have to ask yourself is that something you would really want to do and would this be a good idea?

Vice-Chairman Graveline stated that it sounded very relevant to us. He stated that the Germans were talking about an intercity system, and here Mr. DeWeese was talking about a commuter system.

Mr. DeWeese stated that if there were an alternate rail alignment that was available for upgrading then this would be a completely fair discussion. He stated that everything that he has been told from SCAG and from what he knows of 35 years in the railroad business, the railroads believe they need all of the physical corridor capacity they have in the basin to meet their own current needs. He stated that that is what he has been told from the railroads. He stated that he has no knowledge of the Authority's dealings with the railroads and how they were working that out and so forth. He stated that if the Authority was asking could you take a good straight railroad corridor in this basin and improve it to go faster, the answer is yes you could. He stated he did not know how much it would cost. He stated that a lot of work had been done on various aspects of that. He stated there were a lot of grade separation issues, et cetera. He stated that it was a fair value engineering question.

Member Leonard stated that he noted that in the report in Section 5, it is indicated that the length of the current project was 82 miles, but Mr. DeWeese is quite frank in stating that it will not work unless the full system 273 miles is done. He asked what is their business plan and financial plan for completing the system.

Mr. DeWeese stated that he did not recall in Section 5, that statement. He stated that if Member Leonard says it is there, then it is there. He stated that that was not what was intended. He stated that what was intended is that the 273 mile section will help achieve all benefits, but the initial 80 mile system will stand alone and be fiscally responsible and meet a definite transportation need. "The 273 mile system is better, but the segment we've chosen, the minimum operable section, if you will, works."

Member Leonard stated that on the pie chart he thinks the Authority can stipulate that many of the costs of maglev would be also attributed to any other high-speed mode. He stated that the pie chart shows almost 76% of the cost would be primary and right-of-way and bridges, etc. But 24% being your German source. He asked without a guarantee, it is stated in the letters that the price is to be negotiated, that Parsons/SCAG was cutting it pretty close as far as requirements to buy 70% American. Particularly when you are relying on the cost estimate of a German company that has no experience as far as revenue operation or any track record. He stated that what experience they have had is limited to a 20 mile test track and the Authority hasn't been given any information that they have developed from that 20 mile test track on the grounds that its proprietary information. He asked had he been fully informed and did he (Mr. DeWeese) feel very, very comfortable on the operations cost and the capital costs and if not, fully comfortable, did he have a warm feeling that somebody is going to guarantee them? He stated that the letter he partially read did not say that.

Mr. DeWeese stated, "We have had full cooperation from Transrapid in the development and they have been very candid with us in their costs. We've used their costs in developing our estimates. As far as full disclosure, I have not been to their facility and gone through their files,

but I believe that Transrapid has treated the costs honestly and fairly and told the truth and told things that can be verified. I agree that the letter does say 'cost to be negotiated.' We asked for their best assurance under the circumstances and they gave us what they feel is their best responsible assurance. I am comfortable that this represents something fair that I can recommend. He stated that Mr. Dan Flanagan was available to add anything about this matter.

Chairman Tennenbaum stated that he thinks it is reasonable that these people are saying that if they get a long term maintenance agreement, that they are willing to warranty costs and performance. He stated that certainly that was an element in such a warranty. He stated that then when, "You want to do your financing, you will have to have those numbers filled in. He stated that Mr. DeWeese had accomplished something that the Authority had not.

Al Perdon stated that he wanted to add that, "At the tail end of the visit with the German delegation, it was announced by Transrapid and Lockheed Martin that they had entered into an agreement whereby Lockheed Martin will send their engineers to the demonstration site in Emsland and go through all of the records and convince themselves as investors that the assertions that are being made by Transrapid are substantiated by back-up data. That work is going on right now."

Member Leonard stated that would carry a lot of weight as far as he was concerned and would certainly make him more comfortable if Lockheed did get into proprietary documentation.

Member Leonard asked Chairman Tennenbaum if he had addressed the concerns that SCRRA addressed to him regarding the competition versus working with Metrolink.

Mr. DeWeese stated that Parsons/SCAG is in the process of doing that. He stated that they had established some procedures to work together. He stated that the SCRRA board has passed a resolution that states that they support further study and they want to be involved in Parsons/SCAGs work. He stated that they recognize that SCRRA has a role as a feeder and they recognize that SCRRA's losing riders is not good for them. He stated that he wouldn't say it was settled, but he would say that they were working on it.

Member Fowler asked about the slide that refers to the capital costs of \$4.8 billion. He asked was it a single guideway or dual guideway.

Mr. DeWeese stated that it was a combination of single and double track. He stated that he prepared a schematic showing where there would be single track and where there would be double track. He stated that at LAX, there would be two station platform tracks, then a single track stretch. He stated that about the time the train would take the turn to go north on the rail-right-of-way, it would change to double track through Union Station. He stated they contemplate carrying the double guideway along the 10 to approximately kilometer 43 at El Monte because they believe that if they go and build on the 10 once they will never again go back to build on the 10 because that is going to be difficult construction at best. He stated then there will be a short segment of double track at the Industry station. He stated it would be double again at Ontario.

Member Fowler stated that retrofitting would be a significant cost in the future.

Mr. DeWeese agreed. He stated that going back and adding a second track to an existing operation is difficult, whether it is steel-wheel/steel-rail or this. He stated it was still all the same tough stuff, trying to construct while operating.

Vice-Chairman Graveline asked if anyone has ever tested a multi-car train.

Mr. DeWeese stated that the TR08 is a three section train that has two end cars with the rounded noses, and then one intermediate section.

Vice-Chairman asked, "But never a six car train or eight car train, or ten car train?"

Mr. DeWeese stated that was correct.

Vice-Chairman Graveline asked if a two tier train had ever been tested.

Mr. DeWeese answered no. He stated that "they" (Transrapid) have not indicated that to him. He stated that it would be possible, and what "they" have essentially said is rail car construction, whether it is going to ride on maglev or whether it is going to ride on steel-wheels is relatively similar.

Vice-Chairman Graveline asked if multiple trains had been tested on their tracks with headway.

Mr. DeWeese stated not that he knew of.

Executive Director Morshed stated he had a question on headway. He stated that in Mr. DeWeese's report, it was stated that they would start in 2010 with a 20 minute headway. He asked if that was correct.

Mr. DeWeese stated yes, he thought so.

Executive Director Morshed stated that he also read in the report that by 2020 they needed to go to 10 minute headway. He stated that the question he had was: "If that is the case, is the cost of going to 10 minute headway included in financing plan?"

Mr. DeWeese stated that the cost of going to 10 minute headway was not included in the financing plan. He stated that they meet the demand by making the trains longer and hauling more people per train as opposed to increasing the headway.

Executive Director Morshed stated, "You have a significantly high volume corridor. SCAG thinks they will have 75 or 80,000 passengers a day in that corridor. The best comparison I can come up with is the Bay Area Rapid Transit through the transbay tube. They have headways of three minutes and they have already reached their capacity and are trying to go to 90 second headways. They have a 10 car train, the total train capacity is over 1000 passengers and when the add the crush load, it is probably around 1200. To meet that demand there, they need a less

than 3 minute headway. And yet you with a 8-car train, you are going to try with a 20 minute headway, you are going to meet the demands of the corridor, which are pretty similar."

Mr. DeWeese stated he could not comment on the BART system.

Executive Director Morshed stated, "I suggest that you get the numbers from BART because BART handles about 120 some thousand passengers per day and you are talking about 80. BART was operating with a 10 car train, 22 trains per hour, which is a headway of less than three minutes. How are you going to handle the passengers in the number of trains that you have?"

Mr. DeWeese asked Mr. Larry Weisseman to address this concern.

Mr. Weisseman, of Parsons Transporation, stated, "In relation to the relationship between BART versus what Parsons/SCAG is forecasting in this report, BART has double the ridership that Parsons/SCAG is forecasting. But their service carries a lot more commuters in the peak hour. We're forecasting about 7 million annual commuters using our system and theirs is much higher than that on an annual basis. The other thing that you should keep in mind is the fact that we are carrying a substantial number of off peak riders: air passengers, non-work resident based trips, special event trips. We have high loadings throughout the day. BART does not sustain those kinds of high loading for an 18-hour-period. We also are experiencing ridership in both directions particularly at the max load point between LAX and downtown Los Angeles. Volumes are very heavy in both directions. In year 2020, our max low point is approximately 2800 to 3000 passengers per hour per direction. And our 20 minute headway can accommodate that particular ridership given a consist of 8 car trains to 9 car trains. And each of those trains can carry approximately 900 to 1000 riders."

Executive Director Morshed stated, "If that is the case, then how are you going to finance this system, not only the operating costs, but again, comparing to BART, carrying all those passengers, they are actually charging a fairly premium price in which you can charge a commuter or riders in an urban area and they can only meet 50% of their operating costs. You are projecting that you are actually going to have a lot less passengers and much higher costs, you are going to cover your operating costs plus your capital costs. What are you charging and does the market really bear that kind of a cost?"

Mr. Weisseman stated, "Our models show that what the market can bear at is average fare per rider of approximately \$11-12. That is throughout the day. At peak, the fare is higher, and at off-peak the fare is slightly lower. BART is more in the range of \$3.75 - 4.00 average operating fare per passenger.

Executive Director Morshed stated, "Then you are assuming that Southern Californians are far more generous in how much they are willing to pay for their trip."

Mr. DeWeese stated no, that was not correct. He stated that Parsons/SCAG was basing the ticket price on the market research that was done by Parsons that shows that for a much shorter trip time people will pay a higher price because they value that shorter trip.

Mr. Al Perdon stated that it was important to note what the market is along this corridor.

Chairman Tennenbaum asked whether Parsons staff had seen the memo from the Authority's consultants, Charles River and Associates talking about Parsons ridership assumptions in the model.

Mr. Weisseman stated, "Yes, I have seen the memo. I have a few comments on this memo. I want to express my thanks to Mr. Dan Brand because he has been a valuable peer review members. Parsons has established a modeling peer review of six individuals from around the country to oversee Parsons work, and Mr. Brand is one of those individuals. We wanted to make sure that the kind of forecasting we were doing was going to meet the rigorous requirements of experts from around the country. We recently met with the peer review committee and Mr. Brand was part of this meeting via conference call. Mr. Brand expressed comments at the peer review meeting, some of which were also in his letter.

"Mr. Brand's statements are all focused at the portion of Parsons forecasting that is coming out of the SCAG regional travel demand model. None of his comments relate to the other tools that have been used for providing the forecasts. Those tools are the regional air demand allocation model, which is forecasting air passengers. About 28,000 air passengers have, on a daily basis, been forecast for the year 2020. Our market research effort dealt with special events/special trip generators, of which in this corridor, there are a substantial number of major special events and special generators. By year 2020, there could be as many individual trips in this corridor as 200,000 special event trips and we had a very conservative market share of that that we took about 3%. Mr. Brand agreed that 3% was a conservative percent. Today (presently) this corridor is surpassing the special events/special generator 200,000 with the Laker parade."

He stated that Mr. Brand's comments all related to the SCAG regional travel demand model. "First of all, to set the story straight on the SCAG regional travel demand model, it's the adopted accepted travel forecasting tool for this region. All the agencies in this region have approved its validation calibration. It is a state of the art model and it is one that everyone believes is the latest and greatest, the best to use for forecasting in Southern California."

He stated that Mr. Brand, in his comments, alluded to things such as model constants, and so forth. He stated that Mr. Brand didn't quite paint the full picture of how modeling is done in a travel demand model. He stated that all modes are assigned constants. He stated that Mr. Brand only alluded to the maglev constant. Mr. Weisseman stated that there are many other constants for other modes, auto travel modes have very aggressive constants that deal with very aggressive travel time savings. He stated that he wanted to set the story straight because he believes that Mr. Brand took "it" a bit out context.

He stated that the other thing Mr. Brand mentioned was the very high fares that had been modeled. He stated, "Parsons actually wants to set the story straight on the process that Parsons used here. Yes, Parsons modeled high fares to set a very aggressive, low rider target that our investment community could look at to set a conservative rider number. We did a lot of testing of fares at moderate to lower levels, and just recently, Mr. Brand has not had the benefit of this,

and we want to get the information to him. Mr. Brand has not seen our latest model runs which show where the fare optimization actually is, and it is at a slightly lower level than these first runs show."

He stated that he wanted to point out that Mr. Brand has made some very important comments and findings, but that the full picture isn't necessarily characterized in his comments and he just wanted to add those comments so that the Authority better understands the nature of Parsons forecasting. He stated that the forecasting by Parsons is very broad based, very comprehensive since they are modeling all different fare levels and a lot of different scenarios and alignments are being modeled. He stated that not only are SCAG models being used, but all the other valuable corridor market research and tools that he mentioned are being used to help Parsons come up with the forecasting here.

He stated that there has been some comparisons made of the high-speed rail forecasting that has been done over the past years and the forecasting that Parsons has done here. He stated that he knows that there have been a number that has been forecast of commuters that your system would carry in the year 2020 of 3.5 million annual commuters. He stated that Parsons equivalent number to that is about 6 to 7 million annual commuters. He stated that one important thing to keep in mind is that he does not believe the Authority's system connected LAX with the other stations and Parsons does. He stated there are a lot of commuters from the El Segundo south Bay area that load onto our system and of course, as you know, there are many jobs, Aerospace and so forth, jobs at the El Segundo employment center and of course at LAX itself. He stated that was additional market that Parsons has tapped into that he doesn't believe that the Authority's forecasting had as part of its markets. He stated that one other item on that is that Parsons has assumed good support and feeder services and one of those is smart shuttle, Mr. Brand alludes to that in his letter. He stated that this region has done a lot of research in smart shuttle and there are many operators around the region that have performed demonstrations of smart shuttle. He stated that one of the operators that Parsons presented a case study on Parsons ridership report is Omni Trans, the operator the San Bernardino county area. He stated that they are already starting smart shuttle demonstrations in a number of their communities and Ontario is one that they have on there their slate to get a smart shuttle demonstration underway within the next few years. He stated that this is before maglev would even come into the picture. He stated that they are aggressively moving into this particular demand response technology and they're going to look at the application smart shuttle.

Chairman Tennenbaum stated that the way he read some of Mr. Brand's comments was that Parsons seemed to be assuming Metrolink would continue operation and Parsons/SCAG would have a large number of riders even though Parsons/SCAG would be charging substantially more than Metrolink, but without remarkably shorter travel times. He stated that the other comment he got from Mr. Brand's memo was that Parsons was significantly boosting ridership through the use of the so called "smart shuttle" and the question he had from that was what if Metrolink also used smart shuttle?

Mr. Weisseman stated that in the future, certainly any Metrolink within a smart shuttle service area could be served by smart shuttle as well. He stated that he thinks that today there are not any substantial feeder services in the Inland Empire of this sort of magnitude. He stated that he

thinks that Metrolink does get good feeder service in Orange County and a few other places, but this hasn't emerged yet. He stated that Parsons is looking 20 years into the future and gazing what could be. He stated that Metrolink is experiencing something totally different today.

Chairman Tennenbaum stated that Mr. Brand's conclusion was that Parsons numbers were not investment quality and one of his concerns seems to be that Parsons' reliance on smart shuttle and Parsons' competitive analysis with Metrolink might not be.

Mr. Weisseman stated that Parsons average operating speed end to end for the six station candidate alternative is about 91 miles per hour, a 53 minute end to end travel time. He stated that that is moving three time faster than anything else in the region would in year 2020. He stated that currently, Metrolink operates, depending on which line you're talking about, 37 miles per hour and up to 45 miles per hour on a couple of the lines, so Parsons is talking about a substantial difference in travel times, not to mention more stops in between. He stated that is why Parsons believes they can charge a premium fare. He stated, "If we're operating 2 ½ times faster than Metrolink, that is how we sized our upper end fares, to be 2 ½ times higher than Metrolink's fares." He stated that maglev would provide, in a six station system, a connection to LAX, which currently isn't served by Metrolink. All six Metrolink lines would come together at Union Station with the maglev system. Transfers could take place between any of their six regional lines and magley to get riders to LAX. He stated that therefore, the Orange County line, the Ventura line, the Antelope Valley line would have an additional high-speed connection that could generate additional ridership on their system lines. He stated that there could be Metrolink ridership lost on the Inland Empire lines to magley, but on the other hand, there could be a boost in ridership for some of their other lines.

Chairman Tennenbaum asked Mr. Weissman if he disagreed with the conclusion with respect to the investment quality of Parsons ridership numbers.

Mr. Weisseman stated, "Parsons feels that we have done, given the tools available, the overall markets that Parsons had to assess that we've done the best possible job. By having the peer review groups – the independent outside experts, the one that Dan Brand is a part of, and the internal regional modeling community – Parsons feels that they have done as credible job as possible given the tools and circumstances for these forecasts." He stated that Mr. Brand does raise some good points, and he stated that there are a lot of frank differences of opinion in the modeling community about how to approach modal constants and about how to approach mode choice. He stated that the choice here was that Parsons would run their maglev forecasts with the existing SCAG mode choice model, but then in addition market research told Parsons to try and model it as a more independent mode of travel and that was a disagreement we (Parsons) had with Mr. Brand. He stated that Mr. Brand did not feel that it was appropriate the way Parsons modeled it. He stated that it was a frank difference of opinion.

Chairman Tennenbaum asked was the short answer that Mr. Weisseman does disagree – that the numbers are, in fact, investment quality.

Mr. Weisseman stated that was correct. He stated, "Parsons has set the stage for a very strong push forward on the maglev project with these forecasts. Parsons forecasts a very credible range

of ridership, a low end and a high end that we feel can provide the engineers and investment community with good numbers and good revenue numbers to move forward and do their analysis."

Mr. Al Perdon stated, "The Federal Railroad Administration does not require, at this stage, investment quality ridership analysis." Parsons/SCAG will be doing additional ridership analysis during the EIR period.

Chairman Tennenbaum stated that the Authority has been pretty "hard-nosed" about those things.

Member Leonard stated that one point he found objectionable, since the Authority has not taken the position yet, is Section 8.1 Once the maglev system business plan is accepted a joint powers JPA consisting of the Authority. He stated that he finds that statement unacceptable.

Mr. DeWeese stated that that was what he thought the draft Polanco bill 2019 said that once the plan was approved....

Member Leonard stated that the Authority should not be committed until the Authority says it wants to be committed.

Mr. Al Perdon indicated that the Southern California Regional Airport Authority appeared to be an appropriate JPA to implement the project.

Mr. DeWeese said that wording would fixed.

At the conclusion of Mr. DeWeese's presentation, Chairman Tennenbaum stated that it was the sense of the Authority that it is going to go along with the project subject to the caveats. He stated that the Authority was prepared to support it unanimously. He stated that the caveats are going to be directed toward changing the ultimate content of Parsons/SCAGs document. He stated that for example, to the extent that there are absolute language sections that say that it is the "optimum method" or "it will cost" this, or the estimates with the respect to costs and warranties that the language that has been covered today at the Authority meeting needs to be used. He stated that he is looking for a practical way to get this resolution voted on now, that is subject to the sorts of changes that follow the spirit of this meeting. He stated that it seems to him that that is a supportable legal position.

Member Leonard moved for the draft to be accepted with the conditions attached to the resolution and reflecting the change that SCAG agreed to regarding joining a JPA.

Chairman Tennenbaum stated that the question before the Authority is the extent of which the Authority can embody in the final report, those matters that concern us or whether they have to be part of a letter of transmittal or resolution. He stated that mechanically he is looking for some assistance on that.

Executive Director Morshed stated that the resolution the Authority has been given explains conditions that the Authority is recommending that should be included in the Project Description and then the statement of the resolution becomes part of the Project Description that would then be submitted to the Secretary and FRA.

Chairman Tennenbaum asked if it was conditioned upon changes in the body of the report that comport with the comments the Authority has made today with respect to interpretations of ridership, operating and maintenance, dependency upon long term maintenance agreements, strong financial entities.

Mr. Al Perdon stated that the Parsons/SCAG pledge to the Authority is that they will make the changes the Authority is recommending to the extent that they can in the document itself.

Chairman Tennenbaum asked what it was that would limit Parsons/SCAGs ability to make the recommended changes.

Mr. Perdon stated that he did not think there would be anything that would prevent them from making the changes.

Chairman Tennenbaum stated that the Authority is not asking Parsons/SCAG to change their data. He stated that the recommendations are referring to representation regarding the data.

Mr. Perdon stated that he did not see a problem. He stated that the other option is the Authority could attach the resolution as a "stand-alone" document. He stated that he felt that the preferred way was to incorporate the comments into the document.

Chairman Tennenbaum stated that the Authority is "jealous" about documents that has its name on it. He stated that the Authority would like to have the language track the Authority's sentiments. He stated that to the extent that there may be disagreements between the Authority and Parsons/SCAG, that can be set forth. He stated that the Authority does not think it has the only answers, but that it has its own views.

Mr. Perdon stated that what he suggests is that Parsons/SCAG incorporate those comments/recommendations and get them back to Executive Director Morshed.

Chairman Tennenbaum stated he would rely on staff to see to it that the final voluminous document comports with the public record established here today.

Public Comment

Council Member Ruth Galantar stated that the numbers on the screen in the calculation of the financial situation are different from the ones in the report. She stated that she feels it is important for the Authority to decide which numbers it is endorsing and not endorsing. She stated that she would welcome the opportunity to review a copy of the Charles River Associates ridership projections, if that could be made available. She stated that she is very interested at

how people arrive at ridership estimates because when she was in planning school in the 1960s, they already knew from survey research of actual transit riders that the two major factors that influence people decisions about whether public transit was acceptable were how many times they had to change vehicles and whether they could get a seat. She stated that having spent most of her life as a transit rider, she did not learn to drive until she was 23, she can tell the Authority that those two factors are very important and probably more important than the fare or the travel time.

She stated that we should be realistic about the proposal that SCAG is putting forward. She stated that she keeps reading in the newspapers and what everyone talks about is the beauty of maglev and the reason it might be worth all the money that is required to build it, is that it can get up to 240 miles per hour. But SCAG staff told her that the average speed for the whole trip is 92 miles per hour. She stated that her question, as a rider, would be is there a cheaper technology?

She stated she is yet to find out what the speed is intended to be between LAX and Union Station. She stated that when maglev was first explained to her, it was explained that it would nearly all be done on freeway right-of-way. She stated that she has been trying to figure out the quickest way to run a system along a freeway between LAX and Union Station and there are a couple of problems. She stated that the main problem was interchanges. She stated she was trying to picture how this system would get through the interchange of the 101 and the 110 on its way to Union Station. She stated she would be delighted to find an answer to that. She stated that she thinks there are some genuine practical common sense problems like that that need to be answered before we go around planning to construct new rail lines because they will take a long time to get permitted through the city of Los Angeles or any other entity that they have to go through.

She stated that there are several things that she noticed in the staff's report that she would like to call the Authority's attention to. She stated some were already discussed by Members. She stated the single track requires a minimum of a 20 minute headway but meeting the demand requires a 10 minutes headway, so either we are talking about a single track or we are talking about a double track, and it seems that we are "double talking" at this stage of the process. She stated that her office took particular note that SCAG's system seemed to have built in a 12% contingency in the construction estimates whereas the Authority a 25% contingency and with her experience with city projects publicly built projects is that 25 is a lot more realistic than 10.

She stated that she really wanted to say that her most important concern about this remains the concerns that she has mentioned to the Authority before. She stated that she is not a financial analyst, but that she is an urban planner, and she has been a transit rider and she would like to be a transit rider again in her working life. She stated she does not think we can count on the smart shuttle system and she does not think we can count on people taking it. She stated that the trip you are talking about for somebody from the south bay who may be commuting downtown, there are more jobs in the south bay than there are residents in the south bay and there are more jobs on the west side than there are residents on the westside. She stated that most of the commute is going toward the westside, not away from it. But, she stated that if we assume someone lives in Hermosa Beach and works somewhere in downtown Los Angeles, they will get in their car or on

their bicycle, but more likely in their car, to go to a place where they can get a train. Or they can get in the smart shuttle car, but they will get in a rubber tired vehicle to go someplace to get a train. She stated that if they are trying to go somewhere where they are going to have to change trains, they will leave their house, get in a car, then change to the train, and then change from the train to whatever it is that takes them from Union Station to their office. She stated that we are still talking two changes of vehicle, and one presumes they will get a seat in each of those vehicles. Whether people will pay \$11 for that is highly problematic since people (complain) like crazy about paying \$1.60 for a gallon of gasoline which is enough to get them from the south bay to Union Station. She stated that all of this remains to be seen.

She stated that she believes the Authority is correct in backing off its initial fascination with maglev for a number of reasons and the way she has generally described it to people is that we all get excited about the technology. It is a very exciting technology. But you learned in the course of your work that it appears to cost more than any other technology and the question is, is the marginal benefit of being able to go 92 miles per hour with that technology worth the marginal cost of building that technology versus another one.

She stated that she knows that cooler heads in Sacramento said, "Hey, hold it fellows, we have a problem about this here in the state of California." She stated that Member Epstein mentioned, quite correctly that one of the hurdles both the Authority and SCAG will have to overcome is the unfortunate reputation of rail transportation that now emerges from the MTAs problems over the years. She stated that MTA, Amtrak, the California High Speed Rail Authority, now suddenly the Southern California Regional Airport Authority, which by the way has come into this equation because the Los Angeles World Airports has taken note of the fact that the rail line we really need is the one that goes north-south, and therefore has not leaped to the forefront to say yes we want to help fund this.

She stated that there are a couple of technical things that she would like to know are, how will the maglev train get around corners. She stated that if she was riding this train from LAX to Union Station, and it goes on the freeway right-of-way, it has a fairly broad curve to make the turn because it has to get across the interchange. She stated that if it does not go on the freeway right-of-way it has got to take out something at the corners in order to corner. She stated that she was surprised that in reading the report at the amount of it that is not projected on existing right-of-way. She stated that she would also mention that the Exposition Corridor does not go anywhere near Union Station. She stated that she would like the opportunity to look at this, she stated she can see that the Authority has taken note in its proposed resolution that the Authority still thinks technology selection is premature. She stated that we know why Parsons/SCAG has selected maglev because there is federal money available, it is going to keep a lot of staff and consultants eating for the two or three years if they get it. She stated that she would urge the Authority to be cautious about the maglev project. And she stated that she would urge SCAG to be cautious. She stated that "we" should not get carried away because "we" are still on Earth and we still have a lot of transit agencies.

She stated she met with Amtrak the day before this Authority meeting to talk about their upgrades. She stated that Amtrak is talking about making improvements to places like Union

Station that would have a real impact on this maglev project or on others. She stated she thinks the train shouldn't pass the station just yet.

Chairman Tennenbaum thanked Ms. Galantar for her comments, however he further stated that she was "preaching to the choir." He stated that the Authority has been tough and rigorous most of the Authority's "life." He stated that he feels this maglev project has been enhanced by that. He stated that it is true that there is this federal money that will go somewhere, and it is also true that the Authority now has on the record the distinguished Parsons firm saying that this is the optimum for moving Southern Californians around. He stated that as far as he was concerned this was a new fact.

Council Member Galantar stated that she agrees that the Authority has indeed been rigorous about this maglev project and she appreciates it. She stated that "we" are in a situation, and she did not mean to impugn anyone's motive, but basically SCAG has asked Parsons and the others to prepare an application for maglev funding. She stated that she does not believe they are lying, she stated that she believes that they believe what they are saying and she believes they have built a case for it. She stated that she just believes that Parsons "and the others" are wrong for the reasons she has provided to the Authority. She pointed out that no one is paying her for comments.

Chairman Tennenbaum stated that neither he nor Council Member Galantar are transportation engineers in this part of their lives. He stated that before he did not believe the Authority had Parsons "on the hook" to this extent. He stated that they are a professional organization and they have obligations with respect to such findings and he feels Parsons must take them seriously.

Council Member Galantar agreed.

Chairman Tennenbaum stated he is not in the position to analyze other modes. He stated that he does think that to the extent people are, that those facts will start to merge. He stated that Council Member Galantar pointed out that the assumptions and the ridership data that raises some questions. He stated that he too wonders how high in the air you can hang this train in light of our seismic problems, but these are matters that the Authority will not learn if it does not go a little bit further and without risk to the State and with the admonitions of this Authority, we've concluded that we will take the next step.

Council Member Galantar stated that she would like to leave with the Authority two different motions that are pending with in the LA City Council. She stated one of them is a request to the Los Angeles Department of Transportation to report on maglev as a technology. She stated that she does not know how fast that will happen since her Department of Transportation is not always rapid. She stated that the other is a motion that Mr. Hernandez brought in and that she seconded essentially saying that City Council would like to work together with SCAG to support this proposal or something like it, but they feel in order to do that, the two priorities are first Union Station to east, where ever it is east, but with a stop at Ontario Airport. She stated the second one would be Union Station to Palmdale Airport. She stated that the hesitation there is that if we get it as far as Palmdale Airport that it can keep going.

Mayor Bob Bartlett, Mayor on Monrovia and Maglev Task Force Chair, stated that he wanted to thank the Authority for wrestling with the maglev issue. He stated that he would also like to thank Members Epstein and Andrews who have worked on the oversight group, as well Executive Director Morshed, to try and work this thing out so that it works for everybody. He stated that he would also like to thank the Authority for working on this document. He stated that he is not exactly sure how "we" end up with a final document here because he would like to take it back to SCAG and see if we can't wordsmith a little bit and work with the Executive Director to work for everybody. He stated that the intentions are good and that the bottom line is that California is going to be a winner in all of this and that is what we should all be working for, to make California a winner. He agreed with what the Chairman stated about the Authority being hard-nosed and tough and that if "we" end up with a better product as a result of that, he feels so much the better.

Ms. Beatrice Siev (Ms. Siev is not audible on the tape and therefore, her comments cannot be transcribed.)

Mr. Dana Gabbard, speaking on behalf of TRAK and RailPak, stated that transportation is now the hot issue in Sacramento. He stated that there is interest in it. He stated that maybe "they" are not dealing with it long term, but he feels that there is a concern about it. He stated that having an EIS to do that, he stated that he does not see where that is a cost-effective sort of thing. He stated that transportation is an issue now, he just doesn't think that "we're" really getting too serious. He stated that there is just a lot of talk about money and spending money. He stated that he has been trying to follow this maglev process for over 2 or 3 years now. He stated that he has gone many to many of the RTP meetings and he was getting RTP documents. He stated that up until the very end, he was not given many details. He stated there was a high-speed rail component and they didn't want to give them maps or anything. He stated that suddenly, just as "they" were adopting it, they declared, "Oh, it's a maglev program and it is great!" He stated that "we" were going "Where the hell did they come from?" He stated that "they" rammed maglev straight through and now suddenly the moment it was adopted, they suddenly are having conferences and they're running around. He stated his question was this: Are "we" doing this because of the money or because it is a good policy? He stated we have had two different assertions made. He said he does not care how much money the "feds" give "us". He stated that if "we" cannot afford, it's like saying "how much will you save buying a car?" He stated that a 20 minute headway makes maglev absolutely useless. He stated that if it is less than 100 mile links for the trips, and you are going to get to the station and wait 10 to 20 minutes, then what time advantage is it? He answered his own question by stating none. He stated that smart shuttle is a joke. He stated that "they" have been trying to use it in LA City, and it has been a fiasco. He stated that the cost per rider is huge. He stated that no one, to his knowledge, has done a cost benefit analysis of what would an upgraded Metrolink system do versus this. He stated that if you can get that 75% for the 25% that that Germans did, with their decision, why can't we go that? He stated that that is the key question. He stated that if "we" are throwing away money on something that makes no sense, he has no faith or belief that this will ever happen. He stated that he believes that "we" will waste a great deal of time and effort, and "we" will have important real options that will be pushed off the table in the obsession of chasing this mirage. He stated that "we" do not need this. He stated that it does not make any sense. He stated that conformity is a joke. He stated that Mayor Bartlett has talked about conformity as an explanation for why

we need to build a freeway extension. He stated what "we" need to do is look at real solutions, "we" need to look at options. He stated maglev is basically a "toy" for consultants. He stated that he would like a copy of the maglev Project Description and eventually have some real public process because he feels that almost all of this has been going on behind closed doors with the "big shots."

Mr. Russ Davies stated that \$4.8 billion divided by 80 miles is approximately \$60 million dollars per mile. He stated that he shares Chairman Tennenbaum's concern that there needs to be some kind of documented guarantee that it can come in at such a low cost. He stated that a couple of benchmarks to compare that to: the Blue Line that opened 10 years ago was about \$40 million per mile; the Pasadena Line, by the time it opens will have ended up about \$56 million per mile. He stated that \$60 million is not much money. He stated that the reason he brings this up, is some years ago when Helmut Koal signed the contract to start the maglev from Berlin to Hamburg, the cost guesstimates had it at a lower cost per mile than the already brand new cost per mile for the ICE trains there. He stated that there can be no way that maglev can less than steel wheel on rail. He stated that he commends Chairman Tennenbaum's concern with getting something documented that guarantees that kind of a cost.

Mr. Mike Dickerson, a Director of Train Riders Association of California (TRAC), stated that his group ask the Authority to put a very large spike through this project and kill it now. He stated that he argued the other side of that issue; he felt that the SCAG people should be given enough rope to hang themselves. He stated that he understands that the Authority is clearly giving SCAG enough rope. He stated that he attended the meeting in Germany where maglev was turned down. He stated that he would like to suggest to the Authority to ask Thyssen or Transrapid to guarantee for 25 years the right-of-way and the integrity of the aerial structure and that they bond that in such a way that you know you are not going to have additional costs. He stated that secondly that "they" take the full faith and credit of all the associated companies that made up the consortium to guarantee that if there was an over run, they would be responsible. He stated that those were the two things that killed the German project, in his opinion. He stated that if he had a right-of-way in the world for this technology, LAX to downtown Los Angeles would be one of them. He stated that he would not build it where Parsons/SCAG says they will build it because he agrees with Council Member Galantar that there is no way a maglev train can be put above the freeway. He stated that he understands the economics of it and even suggest that this is not really fair because it cannot be done that way because the curves come around on private right-of-way. He stated that he wants the Authority to do what they think is best, but he would say to give SCAG the rope to hang themselves. He stated that Mr. Perdon is a wonderful person and deserves another two years of work.

Chairman Tennenbaum stated that he wants everyone to understand that the Authority is in favor of new technologies and better ways of transporting people around California. He stated that the Authority just wants "them" to meet standards that are appropriate.

Member Fowler stated that he can support the resolution, to continue to look at maglev, but also look at both systems. He stated that the Authority can review the steel-wheel as the Authority is going to do as a part of the statewide system and "they" (SCAG) can look at maglev. He stated that it seems to him that once this project is committed to as a maglev, and if it proceeds to

implementation, San Diego is going to forevermore be a transfer away from the rest of the state. He stated that it has a significance relative to ridership statewide, etc. He stated that San Diego provided a fair measure of benefits that the overall statewide system derived from its rapid connection. He stated that the only way you will be able to do it, will be to come up the coast, transfer at either Anaheim or take the maglev up to Union Station and transfer to the statewide system. Either that or the statewide system has to be maglev. He stated that the Authority is taking steps to direct us in that direction. He stated that he thinks that continuing to look at both technologies is critical.

Chairman Tennenbaum stated that Member Fowlers concern would be noted and in the record. The following motion was presented to the Authority for vote:

WHEREAS the California High-Speed Rail Authority (Authority) is legislatively mandated to prepare a plan for the construction, operation and financing of a statewide, intercity high-speed train system capable of speeds in excess of 200 miles per hour, and

WHEREAS the Authority has finalized its business plan for the implementation of a statewide high-speed train system after two-and-one-half years of analysis and technical review, and

WHEREAS the Authority has adopted in its business plan a position that it is premature for the state to select a high-speed train technology for California, a position wholly consistent with the Intercity High-Speed Rail Commission, the Legislature, and two governors, and

WHEREAS the Authority finds the following reasons for why technology selection is premature:

- The relative strengths and performance of the technologies can change during the next few years.
- The program environmental impact report (EIR) will provide greater information about what the statewide system elements will be, where the system will go, and how the system would be developed.
- The selection of technology should be competitively bid in an open procurement process that conforms to state law in order to provide the state's taxpayers with the best system for the best price. And

WHEREAS the Authority entered into an arrangement per Governor Gray Davis and Business, Transportation and Housing Agency Secretary Maria Contreras-Sweet to facilitate the state's application on behalf of the Southern California Association of Governments' (SCAG) for the Federal Railroad Administration's (FRA) Maglev Deployment Program, and

WHEREAS Governor Davis stated that while he supported the application, for which Secretary Contreras-Sweet is an applicant on behalf of the state, he was "withholding judgment as to what technology will best serve the needs of Californians until after completion of the program studies," and

WHEREAS the arrangement stipulated that the Authority would serve as contract manager for the Phase One pre-construction activities and allow its name to be on the Project Description, which concludes Phase One and serves as application for Phase Two, and

WHEREAS the Project Description prepared for SCAG is presented for the Authority's consideration, and

WHEREAS the Project Description analyzes the capital costs, ridership and revenue, financing, and environmental issues associated with building and operating a regional Transrapid Maglev system serving Los Angeles International Airport (LAX), Los Angeles Union Station, City of Industry, Ontario Airport, San Bernardino, and Riverside, and

WHEREAS the project description prepared by consultants states the capital costs of the proposed Maglev candidate alternative is \$4.8 billion, would be operational in 2010, would have 15 million passengers per year, would generate \$325 million in revenues, would incur annual operating and maintenance costs of \$76 million, would operate without public subsidy, and would require the construction of a \$250 million steel fabrication plan in the Inland Empire, and

WHEREAS SCAG is requesting the Authority to accept and adopt the Project Description so as to meet the June 30, 2000 deadline set by the FRA.

NOW, THEREFORE, BE IT RESOLVED, that the California High-Speed Rail Authority does not find the information provided in the project description to be sufficient and compelling enough to recommend Maglev for the LAX to Riverside corridor, and

THEREFORE, BE IT RESOLVED, that the California High-Speed Rail Authority recommends to Secretary Contreras-Sweet that the Project Description be submitted to the FRA, as required, with the following statement.

The California High-Speed Rail Authority, upon review of the California MAGLEV Deployment Project Description, does not find the information contained to be sufficient and compelling enough to recommend Maglev technology exclusively for the Los Angeles International Airport to Riverside corridor.

California, and it subdivisions, should continue to review all appropriate high-speed train technologies as potential solutions to the state's intercity and regional mobility challenges. Maglev-specific planning would deprive the state of opportunities for more cost-effective solutions to the state's mobility problems.

- As a state agency, the Authority is very concerned about the precedent of having the state responsible for implementing and operating a regional passenger train system.
- As the attached matrix created by the Southern California Association of Governments (SCAG) shows, a single-track Maglev system in Southern California would cost \$1.2 billion more than a comparable steel-wheel-on-rail-system. The \$1.2 billion difference is \$250 million more than the potential \$950 million from the Federal Railroad Administration

- (FRA). While the Authority does not suggest selecting either technology, it should be noted that steel-wheel-on-rail systems have been proven in revenue service for over 35 years, while the Transrapid Maglev system proposed by SCAG has operated in a test environment only.
- As a result, the reliability of Maglev capital and operating costs and the lack of a Transrapid Maglev maintenance history make it difficult to ascertain how such a system would be built and function in the important LAX to Riverside corridor.
- Furthermore, Transrapid is the only provider of the Maglev system proposed. The Project Description, in effect, endorses a sole source award to Transrapid.
- If the Authority were required to select a high-speed train technology today, it would, in all likelihood, need to select a steel-wheel-on-steel-rail technology. In the Authority's view, selecting the technology provider should be accomplished through an open procurement process that seeks the best system at the best price for the state's taxpayers, and ultimately the high-speed train passengers. If the Authority were to initiate such a process, it does not see how Transrapid could be price competitive with other providers. The Transrapid technology is more expensive to construct and unproven in revenue service. Further, neither Transrapid nor the German government are willing to provide financial performance guarantees for Maglev. As result, the Authority is hard pressed to see how the Transrapid Maglev technology could meet the price and performance criteria that would be critical to selecting a technology provider.
- Even within the Southern California region, concerns exist about how the Maglev system would co-exist with the Metrolink commuter rail system. The three areas of concern enumerated at the Southern California Regional Rail Authority's (SCRRA) meeting on June 2 should be considered:
 - Whether) proposed (Maglev) services...may be competitive versus complementary of Metrolink service.
 - Whether) activities...impinge in any way on member agency-owned rights-of-way or access agreements with freight railroads or other property owners (e.g.: Catellus)
 - Mether) services or activities, which, as proposed, would increase Metrolink operating costs or subsidy requirements.

It is vital, in the Authority's view, that the tens of millions of dollars that the member agencies of SCRRA have invested in Metrolink, as well as the millions that Governor Gray Davis has proposed in his Traffic Congestion Relief Plan, enable Southern Californians to benefit from one of the nation's premier commuter rail systems for years to come.

We are concerned that the Project Description establishes Maglev as the technology of choice for California, selects Transrapid inappropriately as the provider of high-speed trains for the entire state, and commits the state to building a Maglev regional high-speed train

system without any guarantee that the federal government would fulfill its share of the construction funding.

Even if these concerns were addressed, the Authority remains steadfast in its position that future high-speed rail planning in California and its many regions should not be technology specific at this time. And,

THEREFORE, BE IT RESOLVED, that copies of this resolution will be sent to Governor Gray Davis, Secretary Maria Contreras-Sweet, FRA Administrator Jolene Molitoris, California Members of Congress, and Members of the California Legislature.

THE RESOLUTION was adopted unanimously (7-0, Member Bates was absent).

Meeting was adjourned at 4:30PM